

Product Information Sheet

Dimethicone 0.65 – 2 cSt

Polydimethylsiloxane volatile fluids

Features and Benefits

- High spread ability
- Low surface tension
- Low reactivity
- Low vapor pressure
- Good heat stability
- Good levelling and easy rubout
- Essentially odourless
- Volatile carrier
- Compatible with a wide range of cosmetic ingredients

Benefits for Personal Care

- Soft feel and subtle skin lubricity
- Excellent spreading
- Leaves no residue or buildup
- Nongreasy feel

Application

- Personal care products such as hair sprays, cleansing creams, skin creams, lotions, bath oils, suntan products, and nail polishes
- Personal care products such as antiperspirants and deodorants (1 cSt, 1.5 cSt, 2 cSt)
- Industrial applications such as glass vial and lens coatings, household product ingredients, mechanical fluids, penetrating oil ingredients, surface active agents, coatings, electrical insulating fluids and polish ingredients

Typical Data

Property	Unit	Result			
		0.65 cSt	1.0 cSt	1.5 cSt	2.0 cSt
Appearance/ Color		Crystal clear	Crystal clear	Crystal clear	Crystal clear
INCI Name		Disiloxane	Trisiloxane	Dimethicone	Dimethicone
Specific Gravity at 25°C (77°F)		0.760	0.816	0.851	0.872
Refractive Index at 25°C (77°F)		1.3745	1.3826	1.3874	1.3904
Color, APHA		5	5	5	5
Flash Point, Closed Cup	°C	-1	30	57	87
Acid Number, BCP		trace	trace	nil	nil
Melt Point	°C ^{1,2}	-68	-86	-76	-84
Pour Point	°C	-68	-100	-100	-100
Surface Tension at 25°C (77°F)	dynes/cm	15.9	17.4	18.0	18.7
Viscosity Temperature Coefficient		0.31	0.41	0.46	0.48
Coefficient of Expansion	cc/cc/°C	0.00134	0.00134	0.00134	0.00117
Thermal Conductivity at 50°C (122°F)	g cal cm•sec °C	0.00024			0.00026
Solubility Parameter ³		6.8	7.0	7.0	7.1
Solubility in Typical Solvents					
Chlorinated Solvents		High	High	High	High
Aromatic Solvents		High	High	High	High
Aliphatic Solvents		High	High	High	High
Dry Alcohols		Good	Good	Good	Good
Water		Poor	Poor	Poor	Poor
Fluorinated Propellants		High	High	High	High
Dielectric Strength at 25°C (77°F)	volts/mil	300	350	350	350
Volume Resistivity at 25°C (77°F)	ohm-cm	1.0x10 ¹⁴	1.0x10 ¹⁴	5.0x10 ¹⁴	5.0x10 ¹⁴